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THE INFLUENCE OF CHANGING ECONOMIC REALITIES ON AMERICA'S FREE MARKET PARADIGM

BY

COLONEL BLAIR A. PETERSON
United States Army

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THE INFLUENCE OF CHANGING ECONOMIC REALITIES ON AMERICA'S FREE MARKET PARADIGM

by

COLONEL BLAIR A. PETERSON
United States Army

Project Advisor
Dr. Leif Rosenberger

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U.S. Army War College
Carlisle Barracks, Pennsylvania 17013

ABSTRACT

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This paper outlines the general framework of free market thinking in the United States and then examines the influence of current world economic realities that might bring into question our paradigm of free market activity. The author suggests that capitalism has evolved through three fundamentally different phases and in each phase different nations gained and lost economic influence. Central to the discussion of changing economic realities is the influence of technology, competition, and politics. The author concludes that the world is moving through a period of economic transition and that America's absolute allegiance to free market theory and our laissez faire approach to a formal national industrial policy may be blinding the nation to the current economic realities of our times.

INTRODUCTION

The conventional wisdom in Anglo-American economic theory would suggest that the erosion of national competitiveness is simply the result of a maladjustment of market forces that can be corrected by changes in relative wages, exchange rates, and the elimination of unfair trade practices. But the history of modern capitalism tells a different story - one that challenges beliefs that letting the market work will either generate industrial success or reverse competitive decline.[1]

The purpose of this paper is to examine the economic realities of today and to help to determine if these realities suggest that our current paradigms regarding "free market" theory are hampering our ability as a nation to compete in the world market. An investigation of the changing economic realities of our times and their influence on our future economic health is essential if we are to maintain our leadership in tomorrow's world.

The research undertaken for this paper was descriptive, rather than causal, and no attempt has been made to establish and test an hypothesis. The distinction between positive (potentially verifiable or refutable) and normative (subjective) economics is recognized. The only "test" of the validity of the positions developed in this paper will be tomorrow's economic critique of the direction the United States takes as it moves into the economic community of nations in the 21st century.

FREE MARKET THEORY

Capitalism is the economic system based on private ownership of productive resources and the allocation of goods and services according to the activities of the free market. It is the fundamental economic system in America and the economic system that is becoming more pervasive worldwide. But there are different forms of capitalism and over time one form has replaced another as the most viable for economic success. William Lazonick, Professor of Economics at Columbia University, has explained the changes in industrial leadership from Britain in the 1800's to the United States earlier in this century and then to Japan more recently. He explains these economic changes in terms of the changing nature of capitalism and the structures or the business enterprises in the respective nations.[2] In his work he described how "proprietary capitalism," which is the integration of asset ownership with managerial control, dominated the British economic success in the nineteen century. He then illustrates how "managerial capitalism," which is a separation of ownership from managerial control (public corporations), ushered in the twentieth century and the economic dominance of the United States. He explained how propriety capitalism proved inadequate to deal with the technological chan and business complexities of the 1900's and how manage capitalism was made possible because of investments in managerial structures to more adequately deal with the changing economic world. He explains how today "collective capitalism," as practiced in Japan, is replacing managerial capitalism as the most viable

form of capitalism to deal with today's economic realities. The distinguishing features of collective capitalism are (1) the organizational integration of a number of distinct firms in pursuit of a common investment strategy, (2) the long-term integration into the enterprise of personnel below the managerial level, and (3) the cooperation of the government in shaping the social environment to reduce the uncertainty facing private-sector investments.[3]

Many people in this country view all of American business as operating in a economic environment characterized by open competition in a free market and by private or corporate ownership of the means of production and distribution. In short, without really stopping to consider the issue, we frequently see "capitalism" as the only real feature of all forms of American business. Obviously, this is not the case. Our economic system, while based on capitalism, incorporates a full range of economic environments. Unfortunately, when we forget this feature we can draw incorrect conclusions concerning economic activity that operates outside the "normal" range of capitalistic functions. In addition, if we become wedded to economic notions that no longer are as viable as they once were, we increase the probability of pursuing incorrect economic policies that are also no longer as viable as they once were. Professor George C. Lodge of the Harvard Business School has said:[4]

> It is a dangerous delusion to keep mumbling the old myths of free enterprise when they are irrelevant. Ethics require calling a spade a spade. If we are to save the noblest and best of free enterprise and strengthen the forces

of market competition, we must be clear about where it is relevant and where it is not.

In the mixed economy of our country, where both government and private interests exert some control, the notion of a free market is simply erroneous. While the public's ignorance of the absence of a free market is unfortunate, even more distressing is the recurring tendency to judge the operation of an industry or a nation functioning outside a free market environment, as if it were operating in a free market. Add to this, legislation and regulatory guidance, as well as political interaction based on free market theory, and what was at first merely unfortunate soon becomes a specious national opinion that cautions us to avoid any action that would suggest expanding our economic thinking.

Capitalism, like economic reality, is time dependent. As the "marketplace" changes and as the externalities influencing the market change, so must the way we approach our economic thinking. The question of what is relevant must be framed by what is the current reality. Yesterday's economic reality should not hold captive tomorrow's paradigm of what is relevant. Hence, if Dr. Lazonick is correct and we are faced with a period of transitional economics from managerial to collective capitalism, it is prudent for us as a nation to address the current reality.

Today, more than ever before, technology, competition, and politics shape the current reality of "free market" economics. The national security and national interests of this country are

inexorably linked to our economic health. Thus, understanding the influence of and promoting the relationships between technology, competition, and political economics is essential in fostering our national economic health.

THE INFLUENCE OF TECHNOLOGY

For purposes of this paper, science implies the acquisition of knowledge, technology implies the employment of knowledge, and innovation implies the introduction of new products, services, or processes based upon technology.

The common wisdom of today would posit the relationship of science, technology, innovation, and economic growth to be correlated such that science leads to technology and innovation, which leads to productivity, which leads to economic growth.[5] While this may be a convenient way to view the relationships, the linkage is much more intricate; more parallel and less serial, often independent rather than dependent. For example, most historians maintain that technology has often developed independently of science and that many of the great inventions were made by men with little or no scientific training.[6]

Economists generally agree that a positive correlation exists between progress in science and technology (innovation) and economic growth; they differ on how far this correlation extends.[7] The problem of consensus is essentially a problem of measurement. It is exceedingly difficult to measure in an absolute sense the economic returns of innovation and its subsequent contributions to economic growth and international trade. In

addition, there is a very real dilemma in determining which comes first, innovation or economic growth. As a side issue, there is also a question about the social benefit that flows from the correlation between innovation and economic growth.

Professor Simon Kuznets, in his Nobel Prize winning research, found that technological advances have accounted for between 50 and 75 percent of the world's economic growth since 1770.[8] Even if Professor Kuznets over estimated the significance of the relationship by 50 percent, the relationship is still so significant that a prudent nation must address the issue when it considers its economic future.

Technological change has a systemic as well as an idiosyncratic aspect. While much change is the result of unique circumstances and events, even more can be described as a regular evolution in time. It is these systematic regularities that hold the key to understanding technological change and the impact of these changes on economic growth.[9]

Soviet economist Nikolai Kondratieff (1928) developed a theory of capitalist economies rising and falling in cycles occurring about every 50 years and he noted that there was a strong correlation between innovation and these "long wave cycles". His research demonstrated that there was a high degree of innovation in capitalist economies for about 20 years prior to the beginning of the rising wave of a long business cycle. Kondratieff, however, refused to draw a causal relationship between innovation and the long wave business cycles preferring instead to see the investment in new large-scale capital goods as the

causal factor.[10] It has been the work of economists Simon Kuznets (1930), Joseph Schumpeter (1934,1939,1942), and Gerhard Mensch (1979) that has ascribed a central role to technological innovation as a explanation of business cycles and economic growth. Their research has shown that during a rising business long wave, the economy would exploit a cluster of innovations that were introduced earlier. These innovations would then offer new products and opportunities. As time passed, however, nearly everyone would acquire the new products and they would become part of the normal scene and represent replacement industries rather then growth industries. Competition would result in lower profits in a static market. Increasing automation would contribute to fewer jobs and the opportunities associated with the "new" products would decrease. The result would be recession and depression. But these economic conditions would then release both capital and labor. In the search for new opportunities, innovation would again appear and the resulting new products would start a new cycle. There would be an inherent discontinuity in technological progress as the old was periodically swept away by the new.[11]

There have been recurring debates among historians as to why the Industrial Revolution and the technological advances associated with this period occurred in the West. History displays ample evidence that cultural values have a pronounced effect on the generation and implementation of new technology. A statist culture, in which the individual is valued primarily for his contribution to the group and whose position and func-

tions are determined by some centralized mechanism, will result in approaches to innovation very different from those in a culture in which the purpose of society is believed to be to support the individual aspirations of its members.[12]

Interestingly, in the West the cultural values and rugged individualism seemed well suited to an Industrial Revolution that thrived on individual creativity and entrepreneurship. But as time ushered in managerial capitalism to replace proprietary capitalism, more and more of the innovation was the result of groups of individuals working together in the corporation. Today, we are witnessing the development of collective capitalism and its accompanying values and attitudes that promote cooperation and harmony in groups, loyalty to the firm, and other basic ideals found in Confucianism. We are clearly discovering that the more technologically complex the process or product the greater the firm's need for the organizational capability to plan and coordinate; i.e., the greater the need to cooperate and orchestrate the innovative energies of the individual, the firms, and the industries.

The days in which one or two countries could economically or technologically dominate the world are gone. Now more than ever before, national economies are becoming increasingly interdependent, innovations are globally mobile, technological competition is intense and international in scope, and the achievements, strategies, and competence of each nation will have an effect on change in all other nations.[13]

Unfortunately, the United States has no formal science and technology policy. While some implied policy could be inferred from governmental support of specific programs, such programs have been subject to the vicissitudes of politics, public attitudes, and erratic funding patterns.[14] The federal government supports R&D and the education that goes with it for three basic reasons: (1) Basic science for its intellectual value, (2) specific mission needs, such as defense, which is the largest portion of the government's efforts, and (3) support for the nation's economic well-being.[15] The lack of a declared national science and technology policy has resulted in fragmented and inconsistent government support. While military R&D has generally been well supported, there seems to have been a woeful lack of federal support for the nation's economic well-being (competitiveness). Today, the profound consequences of our lack of direction in this regard are all to apparent.

The government of any nation, including the United States, is created to address three basic fundamental needs for its citizens; social, economic, and defense. With the exception of defense, the notion of a market economy and the social ethic in this country have generally fostered a laissez-faire approach to formalized national policies concerning social and economic issues. As with our industrial policy, the undefined, splintered, and decentralized science and technology policy of the past may have been adequate to guide the nation. Today, however, science and technology not only transcend international politics, they also transcend the basic needs fulfilled by governments.

Everything is connected to everything else as far as science, technology, politics, and economics are concerned. As such, a laissez-faire approach to a formalized national policy is both naive and dangerous for a national economy with slow growth and for a nation within an interdependent world economy that is prone to sharp and often sudden changes in supply, demand, technology, and politics.[16] Active government policies are necessary both to focus the requisite scientific and technical manpower and fiscal resources toward a common goal(s) and to enable the economy to respond quickly and efficiently to worldwide structural changes.

While technology is clearly important in influencing economic growth, it does not operate in a vacuum. On the other hand, in both high and low technology products, success in the global market means creating and applying new knowledge, which is to say new technology, faster than one's competition. This is the fundamental law in today's competitive world.[17] In explaining the consensus among economic historians regarding their views about the significance of technology in promoting economic growth, Italian economist Dosi Goivanni and Dutch economist Luc Soete have concluded that international differences in technological level and innovative capabilities are a fundamental factor in explaining the differences in both levels and trends in exports, imports, and income among countries.[18]

The foregoing discussion was meant to highlight the nature of technology in economic development and to illustrate the key role it plays in determining a nation's economic health. Hopefully, the discussion also has illustrated that the current

laissez-faire approach toward a formal science and technology policy does not now serve the best interests of the country. The following discussion regarding the influence of competition and national industrial policy will help to highlight the economic danger of maintaining a laissez-faire policy in the face of a changing economic world.

THE INFLUENCE OF COMPETITION

The significance of competition in the market has a profound effect on both technology and economic growth. Indeed, we have seen how the complex operations of multinational corporations, which are themselves the prime influencing source of any link between technology and international economic activity, are governed in the simplest sense by the laws of supply and demand and controlled by competition.

David Ricardo's theory of *comparative advantage*, which is a generalization of the theory of absolute advantage developed by Adam Smith[19], is frequently cited as a explanation which helps to explain the economic growth among nations. Stated briefly, comparative advantage in the production of goods and services results from international differences in the relative costs of the production of such goods and services. The policy implications of comparative advantage would suggest that a country should emphasize the production of goods and services in which it held a comparative advantage and trade internationally for those goods and services which were not to its comparative advantage to produce. Thus, idealistically, the overall "world output"

(productivity) would be greatest using the same level of inputs if each nation followed the comparative advantage theory and avoided "going it alone" in the context of the world marketplace. The comparative advantage notion is at the heart of the "free trade" approach in international economics. In fact, the argument for laissez-faire in international trade has found theoretical justification in Ricardo's theory of comparative advantage.

Since Ricardo considered only labor as the determining factor in establishing a nation's comparative advantage, his theory is obviously incomplete in today's world economy. Even later attempts to incorporate other factor costs into the comparative advantage concept, such as capital and even technology itself, fall short in fully explaining the relationships. This broader explanation of comparative advantage still fails to address direct investment abroad vice international trade and it assumes the unrealistic position in the international environment of unrestrained free trade.

Stephen Magee, in reviewing the theory of international trade, suggests that the incentive for countries to engage in trade is based on both production and consumption gains. The production gains result from an economy switching the factors of production into those goods in which it has the greatest comparative advantage. The consumption gains result from the ability of consumers to purchase products on world markets that are less expensive than similar goods or services produced domestically.[20] This idea recognizes the importance of product differentiation and consumer preferences as competitive distractors.

Unfortunately, even an "expanded" theory of comparative advantage seems inadequate to explain how nations compete in today's international economic environment. More and more we are seeing market economics driven by cooperation and coordination among businesses and governments, rather than by competition. As Michael Calingaert has said, "In our economically interdependent world, all nations benefit from the prosperity of others."[21]

Most characteristics of a society impart both strengths and weaknesses. In the United States rugged individualism, mobility, and competition encourage innovation but weaken cooperation, institutional loyalty, and commitment to broader community goals.[22] It is precisely this penchant for unfettered competition and rugged individualism that promoted American economic prosperity under managerial capitalism. It has been our zeal for competition and our opposition to monopoly, both public and private, that have become hallmarks of American society. The United States has led the way in the modern world in attempting to institutionalize antitrust and antimonopoly practices in business.[23] There are important reasons why Americans historically have taken "free and open competition" considerations far more seriously than most other countries. The large size of the country, the uneven regional development, and the low dependence on foreign trade due to a strong domestic market are historical examples. Had the United States been a small country with few firms in each industry and heavy dependence on foreign trade, no doubt there would be greater homogeneity of interests. Had this been the case, it is likely that there would have been a greater

tendency among firms and the government to work together to assist interfirm cooperation at the industry level in order to assist industries in having greater competitive advantage in the international markets.[24]

The legislative history and public attitudes in America clearly demonstrate that unrestrained competition is the central focus underpinning our economic philosophy. Most Americans feel intuitively that the "invisible hand" of the free market and unfettered competition are economically sacrosanct in our society. Our economic paradigm is competition in a free market. And yet, if William Lazonick and others are correct in their position that the current period of transitional economics is ushering in collective capitalism, we need to reexamine our economic paradigm.

In an insightful article appearing in the Columbia Journal of World Business recently, Dr. Kosaku Yoshida of California State University, compared competition, as practiced in the United States, with cooperation, as practiced in Japan.[25] He explained how the decline in the United States economy can be traced, in large part, to the excessive practice of free competition. He illustrates the historical basis of free competition and how it has worked to the disadvantage of the American economy in recent years through government efforts to deregulate basic industries for the sake of stimulating more market competition. He claims that the United States penchant for free competition and the subsequent deregulation of the finance industry (savings and loan associations and banks), and the telecommunications

industry (AT&T) for the sake of encouraging competition did not promote the American economy but harmed it seriously. While he recognized that enforced competition by deregulation is not free competition, he nonetheless points out that while competition is being forced among too many players within the United States, the competitive edge of the nation in the international market is being hampered.[26]

Dr. Yoshida explains that the Japanese organizations and management have always emphasized harmony and cooperation as the dominant principle, while at the same time discouraging conflict and competition. In this sense the teachings of Confucianism have formulated the basic behavioral principles. The Japanese state of mind that developed in these ways over centuries has not changed significantly in contemporary times. Consequently, in the process of modern industrialization, Japan did not offer the type of environment that nurtures or adapts to the Western economic principle of full-scale free competition. Following the importation of the Western concept of free competition, the Japanese did not replace cooperation with competition. Instead, they accepted both seemingly contradictory principles. Even now in Japan, an exquisite balance between competition and cooperation is maintained at all levels of society.[27]

History suggests that the changing institutional reality is characterized by the growing importance of planned coordination within the business organization and the growing dominance of the business organization over the determination of economic outcomes. History also shows that the driving force of successful

capitalist development is not perfection of the free market mechanism and unfettered competition but the building of organizational capabilities.[28] The growing importance of planned coordination and cooperation for attaining and sustaining competitive advantage appears to be the central theme in the emergence of collective capitalism.

The defining characteristic of neoclassical economics (the market economy theory) holds that individuals, rather than business organizations, make the critical decisions that guide economic activity. In this theory the optimal economy is one in which market forces determine the nature of the organizations, not one in which organizations determine the nature of markets.[29] But economics is an evolutionary process that changes with the realities of the times. There are surely a sufficient number of successful contemporary examples of market "imperfections" to suggest that perhaps our paradigm of the market economy is incomplete. The combination of international organizational integration within private-sector manufacturing and the active role of government in creating an economic and social environment conducive to the emergence of innovative business enterprises, represents a qualitatively new mode of business organization in the evolution of capitalism. The extent of collectivization of interests under Japanese capitalism contrasts with the more limited planned coordination of the specialized divisions of labor under the managerial capitalism of the United States and the virtual lack of planned coordination that existed during the

days of British proprietary capitalism at the turn of the century.[30]

While the emergence of collective capitalism parallels the Japanese economic model, it is dangerous to assume that the United States will fade into economic history as Britain did during the transitional economic period from proprietary to managerial capitalism. Market economics are still alive and well and competition in the marketplace is still very much reality. In fact, it is because of the competitive spirit of American business and our organizational enterprise that as a nation the United States is adapting quickly to the new economic realities of our times. The American economy remains the world's largest and strongest. In the 1992 year end summary of how the United States did economically, the editors of The Kiplinger Washington Letter cited the following statistics:[31]

> * The U.S. is the world's biggest producer of goods and services, producing 66% more than Japan and nearly as much as all of Europe.
>
> * U.S. share of the world's total output has been roughly constant since the early '60s: about one-fifth. The rising share of Asian nations came primarily at the expense of Western Europe and the Soviet bloc.
>
> * U.S. is first in overall productivity and first in every major sector (manufacturing, services, agriculture, and construction). Our average factory worker today is 20% more productive than Japan's.
>
> * America leads the world in total export sales.
>
> * America's standard of living remains the highest in the world.

Notwithstanding these kinds of aggregate data suggesting the continued health of the American economy and the viability of our competitive position in the world, the emergence of collective capitalism has fostered some fundamental restructuring in American business. Our recovery from the recent recession will leave the composition and structure of American business forever changed. Our attitudes about competition and market economics are also changing. The emerging transnational economy is compelling America to redefine its idea of America.[32] Benjamin Barber, a Rutgers University professor of political science, has stated that the world has changed more rapidly than the ideologies that seek to describe it. He also suggests that America's interdependence with the world is not a pleasant subject and that it requires realism, which is often a bitter pill to swallow in a society that has become accustomed to less sacrifice. He claims that we are beginning to realize that we are subject to the same laws of rise and decline as every other nation.[33] The attitude of American business about foreign competition and international economic structure has changed from one of being rather cavalier through the 1960s and 1970s to one of intense attention and action since that time. From industry wide movements to promote improvements in the quality of goods and services to fundamental changes in managerial attitudes and organizational structure, American business is beginning to move in the direction of collective capitalism.

Evidence of the this movement is pervasive. Recall that one of the distinguishing features of collective capitalism is organ-

izational integration of distinct business units in pursuit of common investment strategies. On any given day we can read about strategic partnerships, even with competitors, as ways American businesses are pursuing to remain competitively viable in the world economy. Boeing's planned joint development of a 600-seat jetliner with European industry giants Daimler-Benz AG of Germany and British Aerospace PLC[34] is just one example. Similar common investment strategies are being pursued in most every industry in America. Even European businesses are following suit, as evidenced by the recently announced structural and management links between France's Aerospatiale and Dassault Aviation SA to cooperate in research, marketing policy, and general corporate strategy.[35]

The second distinguishing feature of collective capitalism that is becoming pervasive in American business is the long-term integration into the enterprise of personnel below the managerial level. Even in the face of unprecedented "downsizing," which has resulted in major reductions in jobs across most industries, there are movements by management and labor to join together in long term relations. The recent willingness of the United Steelworkers Union to relax its long held hardline stance on labor pacts and to seek innovative agreements and long-term accords with U.S. steelmakers,[36] and the overwhelming embrace of Total Quality Management (TQM) and its participative management features across all facets of American business, are examples of collective capitalism spreading across America. Even in situations where corporate management and shareholder confrontations

just a few years ago would have threatened a hostile takeover bid, today a spirit of cooperation often avoids such results. The recent situation at Westinghouse,[37] where shareholders and management worked together to change the company without the aid of former "tools" like hostile takeover or a boardroom coup, is illustrative.

The final distinguishing feature of collective capitalism that is gaining increased momentum in the United States is the cooperation of the government in shaping the social environment to reduce the uncertainty facing private sector investment. More than the other features of collective capitalism, however, the cooperation of government and business is a difficult issue for America to face. While there are certainly many examples of recent efforts in this regard, such as the electronics industry and government cooperation in establishing and funding the Sematech consortium to enhance America's competitive position in semiconductor technology, there are strong opinions both for and against this type of activity in our "free market" society. At the heart of the debate lies the issue of whether or not the United States should have a formalized national industrial policy to support American business competitiveness in the world economy. Frequently, the debate becomes emotional and the focus centers on the propriety of the federal government to pick "winners and losers" among America's businesses and industries that compete in the international market.

To fully appreciate the changing economic realities of our times and their impact on the ability of America to compete in

the world market, it is necessary to address the issue of a national industrial policy. This issue is central and perhaps even paramount in any questioning of the health of our current economic paradigms.

THE INFLUENCE OF AN INDUSTRIAL POLICY

The United States has no formal industrial policy, except perhaps the policy of no policy. While some implied policy could be inferred from government support of specific programs, there is a general lack of coordinated effort between government and industry. Thus, what we have is an industrial policy by default due to the failure of government and industry to effectively address and pursue common rational goals and to support such goals with meaningful programs and resources.

The fragmented informal industrial policy that has evolved in this country has been nurtured by erratic funding, political changes, decentralized economic policy formation, and duplicative efforts. There is no single agency with the overall responsibility for monitoring world markets or the general competitiveness of American industries in the world economy. In addition, and perhaps most alarming, is the fact that the defacto U.S. industrial policy has and does suffer from a lack of strategic focus, especially where the issue of the international competitiveness of American business is concerned.

The systemic issue surrounding the absence of a formalized industrial policy and the adamant opposition to this form of government and industry cooperation is rooted in the laissez faire economic attitude so prevalent in our country. Most

supporters of free market economics would voice disagreement about any steps to promote an industrial policy in the United States. Unfortunately, here again economic reality and theory are at an impasse. The theory suggests that industrial policy will interfere with natural market dynamics resulting in less than ideal economic outcomes. The reality, on the other hand, is that over the years the federal government, through enormous sums spent on defense technology, agriculture, biomedical research, and other fields of science and technology, laid the foundation for many of today's most productive industries.[38] The supercomputer, artificial intelligence, and commercial jetliners are but a few of the products that owe their existence to taxpayer money invested jointly with industry in research and development.[39] More recently, Sematech, which is a $1 billion consortium of 11 private U.S. companies funded jointly by the firms and the government for the purpose of pursuing semiconductor research, has been credited in large part for the turnaround by U.S. firms in recapturing the lead in the world semiconductor market. Clyde Prestowitz, a trade strategist who has advised the Clinton team, credits government intervention for the turnaround and argues that the semiconductor example should be a model for managed-trade approaches in other industries.[40]

As has been suggested, our economic paradigms sometimes blind us to the current reality. Robert Reich, who is Clinton's nominee as Secretary of Labor, has written that:[41]

> A nation's industrial policy is the sum of its macroeconomic policies -- like tax rules,

> research and development grants, credit subsidies, and import restrictions -- as they affect the pace and direction of industrial change. Every advanced nation has an industrial policy.

Reich also maintains, as do a growing number of prominent economists, that the only way to transform our present industrial policy into a form of positive economic change is by centralizing its administration and enhancing its visibility.[42] But government and industry opposition to a formalized industrial policy based on laissez faire economic notions have dominated American thinking and policy. This attitude was summarized very clearly during the Reagan administration in the published Annual Report of the Council of Economic Advisers, which concluded that:[43]

> An industrial policy would not solve the problems faced by U.S. industry. The best way to deal with the many changes in demand that occur in a dynamic economy is to allow investors and workers to respond to such changes. Because they reap the rewards of their successes and bear the costs of their failures, investors will seek out industries that pay the highest rates of return. Similarly, workers have incentives to work where they can earn the highest wages. The free movement of capital and labor in response to new profit opportunities and wages differentials increase growth.

While the foregoing is party line thinking in neoclassical economic theory, it is perhaps so idealistic as to be invalid in today's economic environment. One feature that is obviously lacking in the foregoing position is the penchant in investment strategy and worker mobility for near term returns. Industrial policy, on the other hand, is generally focused on long term

economic considerations that necessitate long term investments in hopes of generating both economic and social returns.

On balance, the implementation of a formal industrial policy is not without its pitfalls. There are ample recent examples, both in industrialized nations (Britain) and developing countries (Mexico), where such policies have resulted in economic failures. The hidden danger in any industrial policy is the ineptitude and/or impropriety of government politicians and bureaucrats using such a policy to promote special interests rather than national interests. It is certainly unrealistic to assume that politics would not influence the formulation and orchestration of a nation's industrial policy. The potential vulnerability of an industrial policy to political influence that could result in harmful economic outcomes is an ever present danger. On the other hand, those that use the argument that government is too inefficient or too prone to political special interests to promote an industrial policy are confusing policy and implementation. Any policy is subject to mismanagement but that reality should not be what prevents a policy from being implemented. On the contrary, that reality should be what forms the basis for insuring that such mismanagement does not occur.

The government's role in industrial policy is not to pick winners and losers, since the market obviously is far more efficient in this regard. Nor is the government's role to be merely the venture capitalist that finances some political special interest group. Regardless of the issue, (industrial policy, defense, social reform, or whatever), the potential for political impropriety is surely not the reason to abandon a

policy that, if implemented and managed properly, can serve the best interests of the nation. The role of government in industrial policy is to be a partner with industry and business to promote the nation's economic interests; to remove current barriers that impede growth and to develop opportunities for future growth. It is this type of planned coordination that is the essence of collective capitalism.

If the nation's political structure is so vulnerable to lobbyists and special interest groups that its industrial policy is used to sustain old and established industries and subsidize the past rather than the future, then one need not worry so much about industrial policy as the general viability of the government itself. Failures with industrial policy in Britain or other countries can be offset by pointing out successes in Japan or elsewhere. But such comparisons miss the point. It is not the policy that is the problem, it is the implementation and management of the policy that determines success or failure. If the political process is the problem, the problem goes far beyond industrial policy.

Perhaps a more defensible argument against a national industrial policy involves the potential claim of protectionism if such a policy were embraced. Use of an industrial policy as an instrument to promote a nation's competitive posture in international markets could be seen as protectionism. The argument goes that if the U.S. were to implement an industrial policy then our trading partners would have to follow suit to ensure that their future competitive interests were not put at a disadvantage. The fallacy in the argument is that many of our

trading partners have, in fact, had formal industrial policies in existance for years. Industrial policies are not pursued to promote protectionism but rather to promote a nation's future comparative advantage. In this sense, industrial policies promote rather than impede competition.

The current reality is that the world economy is more complex than microeconomic theory and the interdependence of and cooperation between government and industry are perhaps indispensable in maintaining a nation's economic well-being. With much of the world moving in the direction of collective capitalism, the question is begged rather the United States can do otherwise and maintain its competitive advantage. Even if it were possible, would it not be prudent to pursue the best features of both managerial capitalism and collective capitalism? Clyde Prestowitz has suggested that the United States must develop a new economic strategy in which international competitiveness is a natural extension of the revitalization of the domestic economy. The heart of the new strategy must be a recognition that what America makes matters; computer chips are more important to the nation's economic health than potato chips. Explicit in this new strategy is a high priority commitment to American leadership in important industries and technology. The country must abandon its laissez faire rationalizations for inaction and develop a proactive and comprehensive industrial policy.[44]

CONCLUSION

The purpose of this paper has been to compare current realities in today's economic world and our notions about free market theory in an attempt to determine if our economic paradigms are hampering our ability as a nation to compete in the evolving world markets. To some degree, this appears to be the case.

Economics is an evolutionary process that changes with the realities of the times and the conditions that prevail in the markets during those times. Applying normative (subjective) economic theory is not like buying panty hose; one size does not fit all! Instead, applying normative economic theory is more akin to sculpturing jello; when you think you have the shape defined something moves the mold. And so it is with our notions of free markets and how they are influenced by technology, competition, and politics.

Without argument, the world is in a period of transition both politically and economically. While the political changes are often abrupt and noticeable, the economic changes frequently are slow and subtle. We expect to change political paradigms, since history has conditioned us to countless political models. Our economic paradigms, on the other hand, we tend to hold more sacrosanct. But history has also provided us with the reality that economic notions also change. In the case of capitalism, William Lazonick's argument that we have witnessed three distinct forms of this economic model are supported by historical example. If Lazonick's argument is accurate, and we are in an economic transition from managerial to collective capitalism, some of the fundamental assumptions surrounding our current free market

thinking come into question. We must be mindful of our economic paradigms, especially our attitude toward industrial policy, so as to avoid being blinded by the current realities.

This investigation suggests that the nation's absolute allegiance to free market theory is unrealistic in today's world economic environment. The role of technology in promoting economic growth, which has been well documented, appears to be an even more significant influence in today's world economic structure. Technology creates and shapes industries. The current reality seems to suggest that government and industry need to cooperate in the development and promotion of a nation's technologies in order to obtain and sustain some competitive advantage in world markets. Competition itself, while ever present in business enterprise, appears to require more balance with cooperation in both commerce and politics.

It has been said that people tend to overweight facts they believe in or depend on, to forget data not going in the direction of their reasoning, and to see confirming instances far more easily than disconfirming instances.[45] For years we have learned that free market economics was best and that the market economy was reality; a notion that is as natural as 2 + 2 = 4. We supported the paradigm with theory and logic. But in today's world, the "invisible hand" of free market forces and unfettered competition is being joined by the illusory hand of political economics. In the face of changing economic realities on a world scale, can we be retaught that 2 + 2 may not always = 4?

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